APPENDIX A - NOAA Boat Inspection

A. PURPOSE.

- .01 This Appendix defines minimum inspection requirements, safety standards, and administrative procedures for NOAA boats.
- .02 NOAA's boat inspection program is designed to ensure that standards of safety are maintained at an acceptable level in order to minimize risk.

B. RESPONSIBILITY.

- .01 The NMAO Fleet Inspection Office is responsible for managing an inspection system for all SRVs, Class III motorboats, and qualified Class II motorboats.
- .02 Senior Field Managers or their designee(s), in cooperation with the NOAA Small Boat Program, are responsible for ensuring that all boats not covered in item B.01 are inspected in accordance with the provisions of this Appendix.
- .03 Responsible Persons shall perform routine inspections of boat(s) under their purview.

C. INSPECTION REQUIREMENTS.

- .01 <u>Timing</u>. All motorboats shall be inspected annually.
- .02 Inspector. All motorboats shall be inspected by either:
- a. an NMAO Fleet Inspector; or
- b. a qualified inspector assigned or approved by the NOAA Small Boat Program.
- .03 Type of Inspection. Inspections conducted by a inspector defined in item C.02b. of this Appendix shall assess operational risk by evaluating the structural integrity, material condition, and all aspects of motorboat outfitting with respect to the motorboat's intended route and employment. This type of inspection is commonly known to marine surveyors as an insurance survey. (Note: A condition and value survey does not meet the inspection requirement because it does not account for, nor does it assess, operational risk.)

.04 <u>Inspection Reports.</u>

a. Reports shall be generated for all SRV, Class III motorboat, and qualified Class II motorboat inspections or surveys.

- b. Reports shall be generated from Class II and smaller motorboat inspections when numerous or significant deficiencies are noted. Such inspection or survey reports shall be forwarded to the NMAO Fleet Inspection Office for review and/or action.
- c. Inspections involving Class II and smaller motorboats that do <u>not</u> reveal numerous or significant deficiencies do not require generation of a report. However, evidence that the inspection was conducted, including findings and recommendations, shall be documented and maintained on file by the Senior Field Manager.

.05 Minimum Criteria.

- a. <u>Hulls.</u> The material condition and watertight integrity of vessel hulls, weather decks, and watertight bulkheads shall be maintained in the condition for which they were originally intended. Any modification, penetration, or repair of these areas shall include adequate measures to ensure that the vessel's original condition of watertight integrity is retained.
- 1. <u>Hull Fittings.</u> Watertight doors, hatches, covers, deck or bulkhead penetrations, and their associated equipment shall be kept in a state of preservation which ensures their suitability for the maintenance of watertight integrity.
- 2. <u>Ventilation Ducts and Gooseneck Vents.</u> Ventilation ducts and gooseneck vents of greater than 2½ inch diameter which penetrate the weather deck shall be provided with a positive means of closure to prevent flooding of the vessel's interior. Covers and their fastening devices shall be attached to or stowed immediately adjacent to each such vent opening.
- b. <u>Engineering Systems</u>. Engineering systems such as propulsion, AC or DC electrical, hydraulic, pneumatic, ventilation, and piping installations shall be inspected when installed. Minimum criteria for these systems shall originate from sources listed on the NOAA Small Boat Program web site.
- c. <u>Equipment</u>. Table 1.0, "Minimum Boat Safety Equipment," lists the minimum required safety equipment that must be on board and maintained in a ready and serviceable condition before any NOAA boat is operated.
- 1. <u>Emergency Equipment.</u> All lifesaving and firefighting equipment shall be of USCG approved and/or Safety of Life at Sea (SOLAS) approved type when applicable. If SOLAS approval is not applicable, then the emergency equipment shall be USCG approved.
- 2. Other Equipment. Other equipment specified in Table 1.0 shall be USCG approved if USCG Standards are applicable to the equipment specified.
- 3. <u>Communications and Navigation Electronics</u>. Table 2.0, "Minimum Boat Communication and Navigation Equipment," lists the minimum required communication and navigation equipment that must be on board, and maintained in a ready and serviceable condition, before any boat is operated.

D. NMAO INSPECTION PROCEDURE.

- .01 <u>Scheduling Inspections</u>. The Responsible Person for any qualified Class II motorboat, Class III motorboat, or SRV shall contact the NMAO Fleet Inspection Office in order to schedule a mutually acceptable date and time of inspection. Approximately one month before the agreed upon inspection date, written notification of the upcoming inspection shall be provided to the Senior Field Manager.
- .02 <u>Inspection Attribute List.</u> An inspection attribute list detailing areas and items to be inspected will be forwarded to the Responsible Person approximately one month prior to the Inspector's arrival.
- .03 <u>Drills.</u> Inspectors may, depending on nature of operations or vessel size and complexity, require an underway demonstration of mission operations or emergency responses to fire, flooding, collision, man overboard, and/or abandon ship emergencies.
- .04 <u>Records.</u> Records, including but not limited to the following, may be examined by the inspectors:
- a. operational risk management plans;
- b. vessel alteration plans;
- c. stability letters or instructions for qualified vessels; and
- d. operator training and certification documents.
- .05 <u>Post-inspection Exit Briefing.</u> Following completion of the on-board or on-site inspection, the Inspector will conduct an exit briefing with the Senior Field Manager and the Responsible Person on the general findings of the inspection.
- .06 <u>Do Not Operate Order.</u> An NMAO Fleet Inspection Officer has the authority to prevent any motorboat from operating if the Inspector determines that the motorboat possesses deficiencies which represent a significant or unacceptable risk to life, property, or the marine environment.
- .07 <u>Inspection Report.</u> A written report of the findings of the inspection will be sent from NMAO within 15 business days to the appropriate Deputy Assistant Administrator or Director, the field activity's Senior Field Manager, and NOAA's CFO/CAO. The report will detail areas of deficiency as well as risks presented to personnel, vessel, environment, mission, and public relations. The report will consist only of those items previously discussed in the post-inspection exit briefing.
- .08 <u>Response.</u> The Senior Field Manager will file a written response indicating corrective action taken, or anticipated to be taken, with respect to the deficiencies listed in the inspection report. Senior Field Managers should indicate whether assistance is required to correct any reported

deficiency. The response shall be provided to the NMAO Fleet Inspection Office within 15 business days after receipt of the inspection report.

ATTACHMENTS:

Table 1.0 - Minimum Boat Safety Equipment

Table 2.0 - Minimum Boat Communication and Navigation Equipment

TABLE 1.0 - Minimum Boat Safety Equipment

NOTE: This Table is based on USCG equipment carriage requirements for recreational vessels and is intended to provide minimum acceptable levels of outfitting for research motorboats and small research vessels. Exemptions to these requirements may be granted by the NOAA Small Boat Program on a case-by-case basis following examination of an operational risk assessment.

EQUIPMENT	MOTORBOAT CLASSIFICATION					
	CLASS A	CLASS I	CLASS II	CLASS III	SRV	
Anchor	Optional, depends on nature of operations	Optional, depends on nature of operations	One	One, as required by design calculations		
Portable Fire Extinguishers	1 Type B-I (when boat has enclosed compartment)		2 Type B-I or 1 Type B-II. A Fixed System equals one B-I	As required by application of appropriate regulation.		
NOTE: B-I type approved hand portable extinguishers contain: 1.25 to 2.33 gallons Foam, 4 to 15 pounds Carbon Dioxide, or 2 to 10 pounds Dry Chemical; B-II type approved hand portable extinguishers contain: 2.5 gallons Foam, 15 pounds Carbon Dioxide, or 10 to 20 pound Dry Chemical.						
Backfire Flame Arrester and Drip Pan	One approved device on each carburetor of all installed gasoline engines, not applicable to outboard engines or diesel engines.					
Navigation Lights	As described in Navigation Rules, COMDTINST M16672.2C. Direct questions regarding application of the Rules to NMAO Fleet Inspection Office.					
Oars/Paddles	One Set	One Set	None	None	None	

EQUIPMENT	CLASS A	CLASS I	CLASS II	CLASS III	SRV	
Magnetic Compass	None	One handheld bearing compass	One, with current deviation card	One, adjusted with current deviation card		
Ventilation	At least two ventilator ducts, fitted with cowls or their equivalent, for every engine or fuel tank compartment of decked over boats that use gasoline or other fuel of a flash point less than 110 degrees Fahrenheit. Boats of such construction shall also be outfitted with a powered bilge exhaust blower which has an arc resistant motor and is wired independently of the ignition starting system.			As required by application of appropriate regulation.		
Personal Flotation Devices	One appropriately sized device for every person embarked aboard.					
Ring Life Buoys or Buoyant Cushions	None	One ring life buoy or buoyant cushion.		As required by application of appropriate regulation.		
Lifeboat, Raft, or Buoyant Apparatus	None	None	None	As required by application of appropriate regulation.		
Emergency Tiller or Steering System	None	None	As required by applic	ed by application of appropriate regulation.		
First Aid Kit	One	One	One	One	One	
NOTE: First-aid kit contents should be adequate for type of operation and skill level of personnel expected to administer first aid.						
Whistle/Horn	Some means of making an efficient sound signal audible for ½ mile for at least 4 to 6 seconds.			As required by application of appropriate regulation.		
Bell	None	None	None	One, ≥ 8" Diameter		

EQUIPMENT	CLASS A	CLASS I	CLASS II	CLASS III	SRV
Visual Distress Signals	One electric distress light or 3 combination day/night red flares when operating between sunset and sunrise.	One orange distress flag, or one electric distress light, or three hand-held or floating orange smoke signals, and One electric distress light, or three combination (day/night) red flares: handheld, meteor, or parachute type		As required by application of appropriate regulation.	
Navigation Rules	None			One Copy	
Nautical Charts	None	One waterproof chart of the operations area	chartlet covering	One of each chart covering the vessel's normal operations area corrected through the most current Notice to Mariners	
Oil Placard	None			One	
Garbage Placard	None			One	

TABLE 2.0 - Minimum Boat Communication and Navigation Equipment

	DISTANCE FROM SHORE OR SUPPORT VESSEL				
EQUIPMENT	Less than 2 miles within protected Bays, Sounds or Rivers	0 - 2 Miles	2 - 20 Miles	> 20 Miles ¹	
VHF Radio ²	One	One	Two	Two	
HF Radio ^{2, 3}	None	None	None	One	
GPS or LORAN	None	One	One	One	
EPIRB ⁴	None	None	One	One	
SART	None	None	None	One	
Cellular or Satellite Phone	None	None	One	One	

¹ Vessels operating greater than 20 miles from shore or support vessel may be required to comply with the provisions of the Global Maritime Distress and Safety System. GMDSS entails specific outfitting with regard to electronics such as radios capable of digital selective calling (DSC), and assignment of a Maritime Mobile Service Identity (MMSI) for each vessel's radio installation.

NOTE: RADAR and depth sounders may be recommended or required minimum equipment for qualified Class II motorboats and larger craft after evaluation of operational risks.

² All marine radios purchased after the effective date of this Order must have DSC capability and VHF radios must be able to receive NOAA National Weather Service SAME (Special Area Message Encoded) Marine Weather Alerts when available in the boat's operational area. Radios equipped with DSC require issuance of a MMSI number.

³ Appropriate FCC or GMDSS radio operator's licenses are required.

⁴ EPIRBs equipped with a GPS receiver to transmit position of distress are highly recommended.